

# **DART SERVICE INSTRUCTION**

TO AMEND INSTALLATION INSTRUCTIONS IIN-D350-689 REV. B

REF TCCA STC: SH02-33

REF FAA STC: SR01620NY

REF EASA STC: EASA.IM.R.S.01453

REF BRAZILIAN STC: 2005S03-09

## **PURPOSE:**

TO PROVIDE CUSTOMERS WHO HAVE PURCHASED D350-689-011/-021 DUAL HIGH BACK SEAT KITS WITH AN OPTIONAL D350-689-031 ARMREST/CONTROL GUARD KIT.

THE D350-689-031 ARMREST/CONTROL GUARD KIT REPLACES THE D350-689-019 CONTROL GUARD KIT, WHICH WAS FOUND TO BE INEFFECTIVE.

THE D350-689-031 ARMREST/CONTROL GUARD KIT ACTS AS BOTH AN ARMREST AND A GUARD, THAT PREVENTS PASSENGERS FROM SLIDING OFF THE INBOARD SIDE OF THE SEAT INTO THE CONTROLS.

## **WEIGHT AND BALANCE**

Installation	Weight	LATERAL		LONGITUDINAL	
		Arm	Moment	Arm	Moment
D350-689-031 ARMREST/CONTROL GUARD KIT (Seat's Fwd position)	1.4 lb 0.64 kg	-9.0 in -0.23 m	- 12.6 in-lb -0.15 m-kg	60.7 in 1.54 m	85 in-lb 0.99 m-kg
D350-689-031 ARMREST/CONTROL GUARD KIT (Seat's Aft position)	1.4 lb 0.64 kg	-9.0 in -0.23 m	- 12.6 in-lb -0.15 m-kg	64.7 in 1.64 m	91 in-lb 1.05 m-kg

CANADA  
DEPARTMENT OF TRANSPORT  
AIRCRAFT CERTIFICATION  
BRANCH  
DAO # 01-O-01

APPROVED

BY:

D. SHEPHERD (DE # 02)

DATE: 12.07.11

CERT. NO.: SH02-33

ISSUE NO.: 1

B	KIT RENAMED FOR CLARITY	AJS	12.07.11
A	NEW ISSUE	AJS	12.06.14
REV.	DESCRIPTION	BY	DATE
DESIGN	AJS	<b>DART AEROSPACE LTD</b> HAWKESBURY, ONTARIO, CANADA	
DRAWN	AJS		
CHECKED	9P	DRAWING NO.	REV. B
MFG. APPR.	N/A	DSI 9619	SHEET 1 OF 5
APPROVED		TITLE	SCALE
DE APPR.		ARMREST/CONTROL GUARD KIT	NTS
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**PARTS LIST:**




QTY -011	QTY -013	QTY -021	QTY -023	QTY -031	QTY -041	QTY -043	PART NUMBER	DESCRIPTION
X							D350-689-011	DUAL HIGH BACK SEAT INSTL, LH
1	X						D350-689-013	FLOOR PROVISIONS KIT
		X					D350-689-021	DUAL HIGH BACK SEAT INSTALLATION, LH (REF DSI 9419)
		1	X				D350-689-023	ENERGY ATTENUATING FLOOR PROVISION KIT (REF DSI 9419)
				X			D350-689-031	ARMREST/CONTROL GUARD KIT
1					X		D350-689-041	DUAL HIGH BACK SEAT ASSEMBLY
		1				X	D350-689-043	DUAL HIGH BACK SEAT ASSEMBLY (REF DSI 9419)
				1			D3021-043	TUBE ASSEMBLY
				1			D4666-041	ARMREST ASSEMBLY
				1			D4671-1	ARMREST CUSHION
				1			AN4-4A	BOLT
				1			AN4-10A	BOLT
				1			AN4-17A	BOLT
				1			AN970-4	WASHER
				2			MS21042L4	NUT
				4			NAS1149F0432P	WASHER

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# **PROCEDURE:**

- 1) THIS INSTALLATION KIT COMES WITH (1X) D4671-1 ARMREST CUSHION. THIS IS AN UNUPHOLSTERED PIECE OF FOAM TO BE USED TO CUSHION THE SEAT'S OCCUPANT FROM THE ARMREST. IT IS NOT REQUIRED TO BE INSTALLED.

FOR CUSTOMERS WISHING TO INSTALL THE D4671-1 ARMREST CUSHION, IT CAN BE CUT TO THE LENGTH DESIRED BY THE INSTALLER. IT CAN BE UPHOLSTERED WITH FABRIC THAT MEETS THE BURN TEST REQUIREMENTS OF FAR 27.853 (OR FAR 25.853b), PRIOR TO INSTALLATION.

INSTALL THE CUSHION BY SLIPPING IT OVER THE D4666-041 ARMREST ASSEMBLY.

- 2) REMOVE THE D350-689-041/-043 SEAT IN ACCORDANCE WITH ICA-D350-689, SECTION 25.2 / 25.4.
- 3) FOR CUSTOMERS EQUIPPED WITH THE D350-689-019 CONTROL GUARD KIT, REMOVE AND DISCARD THE KIT. PLUG THE HOLE IN THE SEAT BACK STRUCTURE USING THE (1X) AN4-10A BOLT, (2X) NAS1149D0432J WASHERS AND (1X ) MS21042L4 NUT PROVIDED IN THE D350-689-031 KIT AS SHOWN IN FIGURE 1.
- 4) REMOVE THE D3021-041 TUBE ASSEMBLY FROM THE SEAT BASE STRUCTURE, BY UNFASTENING THE (6X ) MS27039-1-19, (2X) MS27039-1-17 SCREWS, (8X) NAS1149D0332J WASHERS AND (8X) MS21042L3 NUTS AS SHOWN IN FIGURE 2. RETAIN THE HARDWARE IF SERVICEABLE.
- 5) REFERRING TO FIGURE 2: REPLACE THE D3021-041 TUBE ASSEMBLY WITH THE D3021-043 TUBE ASSEMBLY ENSURING THAT THE END WITH THE D4667-041 STUD ASSEMBLY FACES INBOARD. REINSTALL THE (6X) MS27039-1-19, (2X) MS27039-1-17 SCREWS, (8X) NAS1149D0332J WASHERS AND (8X) MS21042L3 NUTS. TORQUE FASTENERS TO 20-25 in-lb (2.3-2.8 Nm).
- 6) REFERRING TO FIGURE 2: INSTALL THE D4666-041 ARMREST ASSEMBLY ONTO THE SEAT BASE USING (1X) AN4-4A BOLT AND (1X) AN970-4 WASHER. INSTALL FINGER TIGHT. DO NOT TORQUE AT THIS TIME.




ROTATE THE D4666-041 ARMREST ASSY UNTIL THE HOLE AT THE AFT END OF THE TUBE ALIGNS WITH THE CENTER LINE OF SEAT BACK TUBULAR STRUCTURE . USING THE HOLE IN THE ARMREST AS A GUIDE DRILL Ø0.257 THRU THE SEAT BACK STRUCTURE.

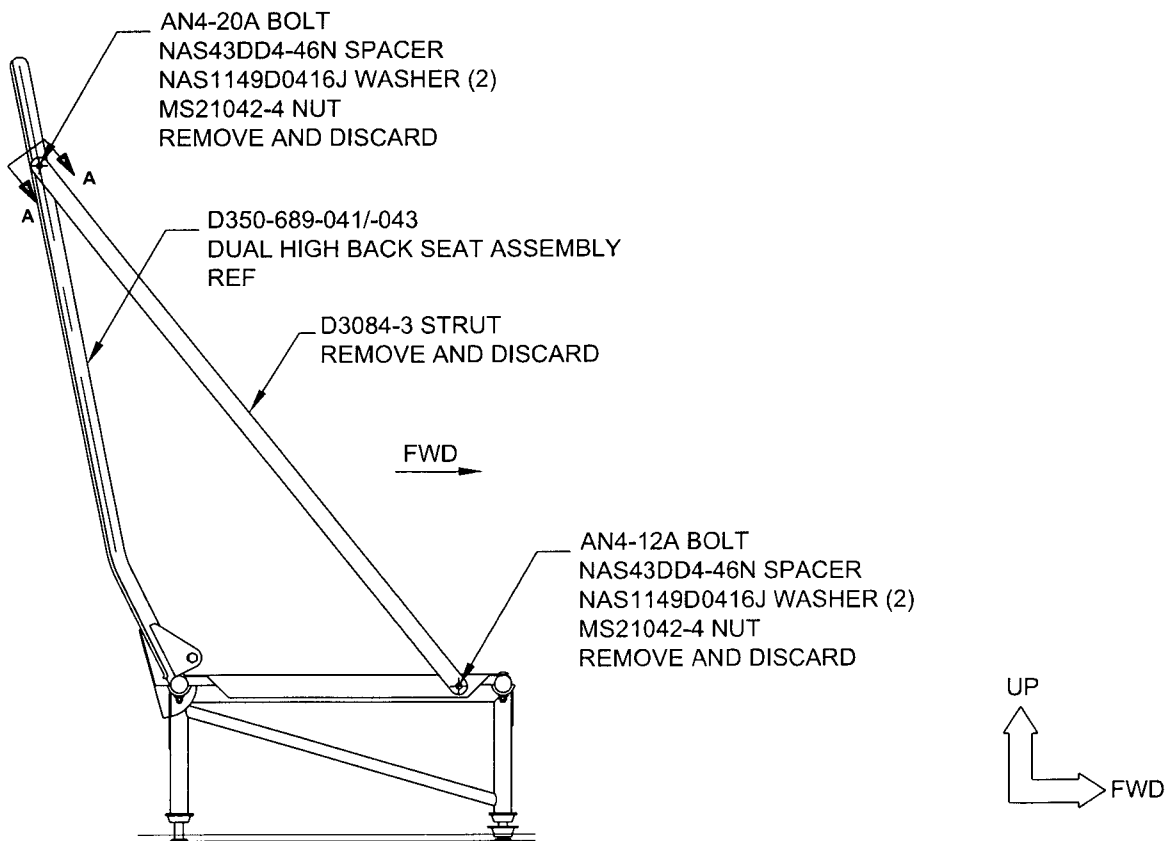
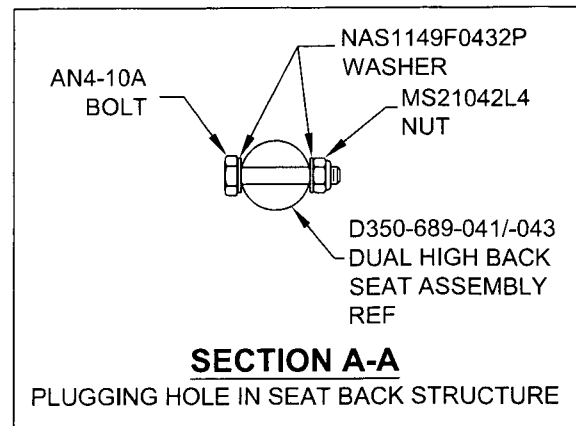
INSTALL (1X) AN4-17A BOLT WITH (2X) NAS1149F0432P WASHER AND (1X) MS21042L4 NUT.

TORQUE AN4 BOLTS TO 50-70 in-lb (5.6-7.9 Nm).

- 7) REINSTALL THE MODIFIED SEAT IN ACCORDANCE WITH ICA-D350-689 SECTION 25.3/25.5.
- 8) UPDATE THE AIRCRAFT LOG BOOK TO INDICATE INSTALLATION OF THE D350-689-031 KIT AND ADJUST WEIGHT AND BALANCE RECORD FOR THE AIRCRAFT WITH THE WEIGHT AND BALANCE DATA PROVIDED IN THIS DOCUMENT.

CANADA DEPARTMENT OF TRANSPORT AIRCRAFT CERTIFICATION BRANCH DAO # 01-O-01
APPROVED 
BY: D. SHEPHERD (DE # 02)
DATE: 12.07.11
CERT. NO.: SH02-33
ISSUE NO.: 1

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DRAWN	AJS	
CHECKED		DRAWING NO. REV. B
MFG. APPR.	N/A	DSI 9619 SHEET 3 OF 5
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**FIGURE 1: Removal of D350-689-019 Control Guard Kit**

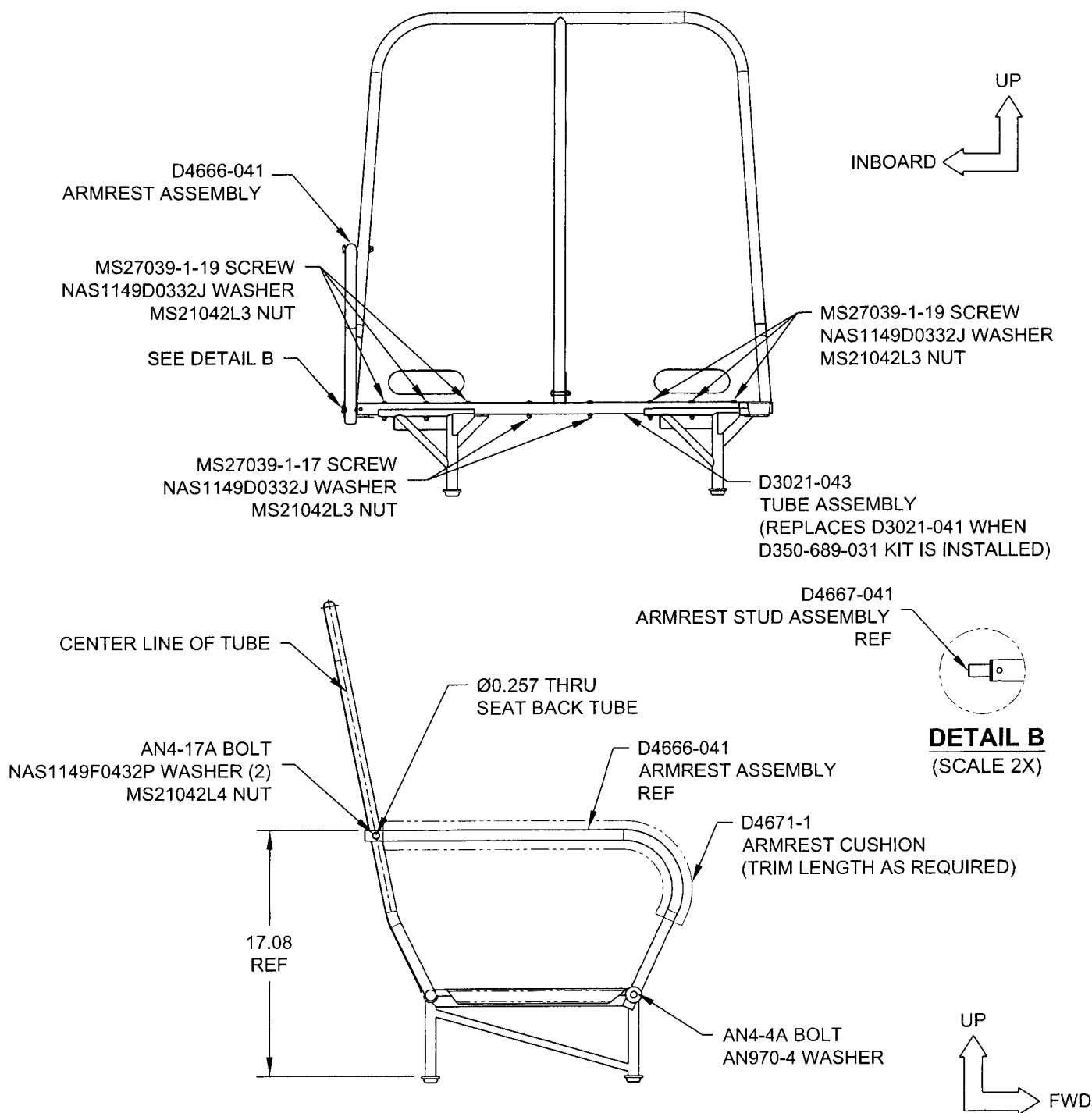
CANADA  
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**APPROVED**

BY: *[Signature]*  
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**FIGURE 2: D350-689-031 ARMREST/CONTROL GUARD KIT**

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